REMARKS/ARGUMENTS

Reconsideration and withdrawal of the Examiner's rejection of the above-identified application is respectfully requested in view of the foregoing amendments and following remarks. Claims 1-26 are in the application. Claims 1-3, 17 and 24-26 have been withdrawn. Claims 13-16, 18 and 19 have been amended. No new matter has been added. The Examiner has required the election of one of the following species for further prosecution:

Species I:	drawn to the extruder head embodiment of claims 2 and 3;
Species II:	drawn to the extruder head embodiment of claims 4;
Species III:	drawn to the extruder head embodiment of claim 5;
Species IV:	drawn to the extruder head embodiment of claim 13;
Species V:	drawn to the extruder head embodiment of claim 14;
Species VI:	drawn to the extruder head embodiment of claim 15;
Species VII:	drawn to the extruder head embodiment of claim 16;
Species VIII:	drawn to the extruder head embodiment of claim 17;

Species IX: drawn to the extruder head embodiment of claim 18;

Species X: drawn to the extruder head embodiment of claim 20;

Species XI: drawn to the extruder head embodiment of claim 21;

Species XII: drawn to the extruder head embodiment of claims 22 and 23;

Species XIII: drawn to the extruder head embodiment of claim 24;

Species XIV: drawn to the extruder head embodiment of claim 8;

Species XV: drawn to the extruder head embodiment of claims 9 and 10;

Species XVI: drawn to the extruder head embodiment of claim 7;

Species XVII: drawn to the extruder head embodiment of claims 11 and 12; and

Species XVIII: drawn to the extruder head embodiment of claims 25 and 26.

Applicants elect, with traverse, Species XV, encompassing claims 9 and 10 (and generic claim 6). Applicants acknowledge the indication that claim 6 is generic, and has amended claims 13-16 and 18-23 to depend from claim 6.

However, Applicants respectfully traverse the restriction requirement. It is believed that independent claims 6, 7 and 11 all embody a unitary invention and should be examined in a single application. The dependent claims merely modify this invention.

The device according to Claim 6 has an elastically deformable sleeve that is guided to move radially on slide surfaces, and can be radially deformed by means of setting devices. The sliding surfaces support the sleeve towards the top and the bottom. The elastically deformable sleeve has a conically widened region towards the extrusion die exit end, and possesses an interior sleeve diameter, at the extrusion die exit, that is greater than the inside diameter measured at the top face. The diameters at the inlet-side end and at the outlet-side end of the sleeve are therefore different. In this way, forces that are exerted on the sleeve by the melt flow in the flow direction towards the sleeve can be compensated. This force compensation is explained in detail on page 6, third paragraph, to page 7, first paragraph of the application.

In the case of the structure of the sleeve according to the invention, with different diameters on the inlet side and the outlet side, there is the risk that warping will occur in case of radial deformation of the sleeve. Warping is understood to mean wave-shaped elevations and depressions at the top edge of the sleeve or the bottom edge of the sleeve. Such warping causes disruptive leaks between the sleeve and the corresponding slide

surfaces of the extrusion die body. In order to prevent the formation of such warping, the force application points of the setting devices are established to lie outside the center, along the sleeve. In this connection, the wall profile of the sleeve and the position for the force application point of the setting devices are in interplay. The invention is based on the teaching that the wall profile of the sleeve (with different diameters at the inlet and the outlet) and the positioning of the force application points for the setting devices (outside of the center) can be coordinated with one another in such a manner that the top face of the sleeve, which is guided on a slide surface of the extrusion die body in this manner, will at least approximately maintain its plane parallelity relative to the slide surface in the case of a deformation of the sleeve.

The asymmetrical shape of the sleeve, which deviates from a cylinder shape, the position of the force application points, as well as the radial guidance of the sleeve, are technologically related to one another within the scope of the claimed teaching. The following subordinate claims specify these characteristics. Claims 8 to 10 relate to the shape of the sleeve. Claims 13 and 14 relate to the position of the force application points, so that warping can be avoided. Claims 15 and 16 contain a computer method for determining the force application points. Claims 18 to 23 relate to the radial guidance of the sleeve.

The following figures and the figure descriptions that belong to them relate to exemplary embodiments of this invention: Figure 2 to 5, 7, 8, Fig. 10b to 10g.

The device according to Claim 11 also has an elastically deformable sleeve that is guided to move radially on slide surfaces, and can be radially deformed by means of setting devices. The sleeve has a different diameter at the inlet-side end than at the outlet-side end, specifically for compensation of the forces in the flow direction exerted on the sleeve by the melt flow. It is explained on page 8, first paragraph (English text) that the force compensation of the axial forces exerted on the sleeve by the melt flow is also possible, in analogous manner, if the sleeve is arranged on the mandrel. The objects of Claims 6 and 11 are consequently based on the same inventive idea. Fig. 11 and 12 show exemplary embodiments of a device that is covered by Claim 11.

The device according to Claim 7 also relates to a device having an elastically deformable sleeve that is guided to move radially on slide surfaces and can be radially deformed by means of setting devices. As in the embodiment according to Claim 6 described above, the sleeve is arranged in the extrusion die body and has a conically widened region towards the extrusion die exit end, whereby the inside diameter of the sleeve measured at the top face is smaller than the inside diameter of the sleeve at the extrusion die exit. Just as in the device according to Claim 6,

axial forces that are exerted on the sleeve as a result of the pressure progression in the melt channel as well as the flow resistance, are compensated by the different diameters on the inlet-side end and the outlet-side end. The force compensation therefore occurs, just like in the device according to Claim 6, in that the inside sleeve diameter at the top face of the sleeve is selected to be smaller than at the extrusion die exit. The resulting compensation force is determined by the projected ring surface that is defined by the inside diameter of the sleeve at the extrusion die exit and the inside sleeve diameter at the extrusion die inlet, multiplied by the pressure in the extrusion die gap that prevails at the extrusion die exit end.

Because of the asymmetrical structure of the sleeve according to the invention, there is the risk that in the case of radial deformation of the sleeve, warping will occur. While this warping is counteracted, according to Claim 6, in that the position of the force application points in the lengthwise direction of the sleeve is changed and the force application points are established to lie outside the center, Claim 7 now presumes that the force application points of the setting devices are established at half the height of the sleeve. The warping at the top edge of the sleeve, which is to be feared, is counteracted, according to Claim 7, in that the sleeve is formed with an outside collar at least at one end. The collar changes the behavior of the sleeve in case of radial deformation. By appropriately sizing the collar, the result is achieved that the

top face of the sleeve, which is guided on a slide surface of the extrusion die, at least approximately maintains its plane parallelity relative to the slide surface in the case of a deformation of the sleeve. Claim 7 is based on the same technical problem as that of Claims 6 and 11. The solutions for this task are also technologically related. The invention is a uniform one.

The exemplary embodiment of Fig. 6 is covered by Claim 7, because the force application points are arranged at half the height of the sleeve. Furthermore, the sleeve is provided with a collar 9.

Moreover, it is believed that any search for the species embodied in Group XV would necessarily include a search of the species embodied in the remaining groups. Thus, the simultaneous search for all the groups is believed not to constitute an unreasonable search for the Patent Examiner. In addition, it is believed that the objectives of streamlined examination and compact prosecution would be promoted if a search were conducted simultaneously for all of the groups. Also, the necessity of filing multiple patent applications for the same invention does not serve to promote the public interest. This is because of the extra expense that is involved, in filing fees and examination costs, as well as the burden upon the public due to the necessity of searching through a multiplicity of patent files in order to find the complete range of subject matter claimed in several

different patents that could otherwise be found in one issued patent only.

Applicants reserve the right to file a divisional patent application for the non-elected inventions.

Therefore, Applicant respectfully requests that the Restriction Requirement be withdrawn and all of the claims be examined in one application.

Respectfully submitted,
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